

# V&V Reference Report

## L2 ASCDS Version : 10.8

Observation 21754 - L2 Version 1  
Chandra X-Ray Center

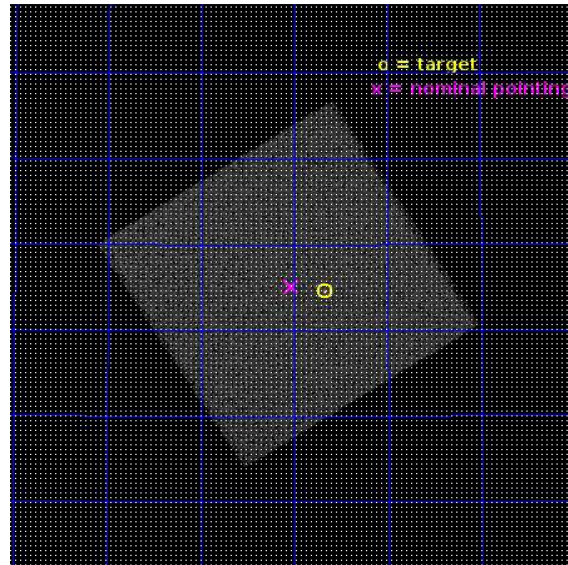
L2 Processing Date : Sep 4 2019

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# 1 Front

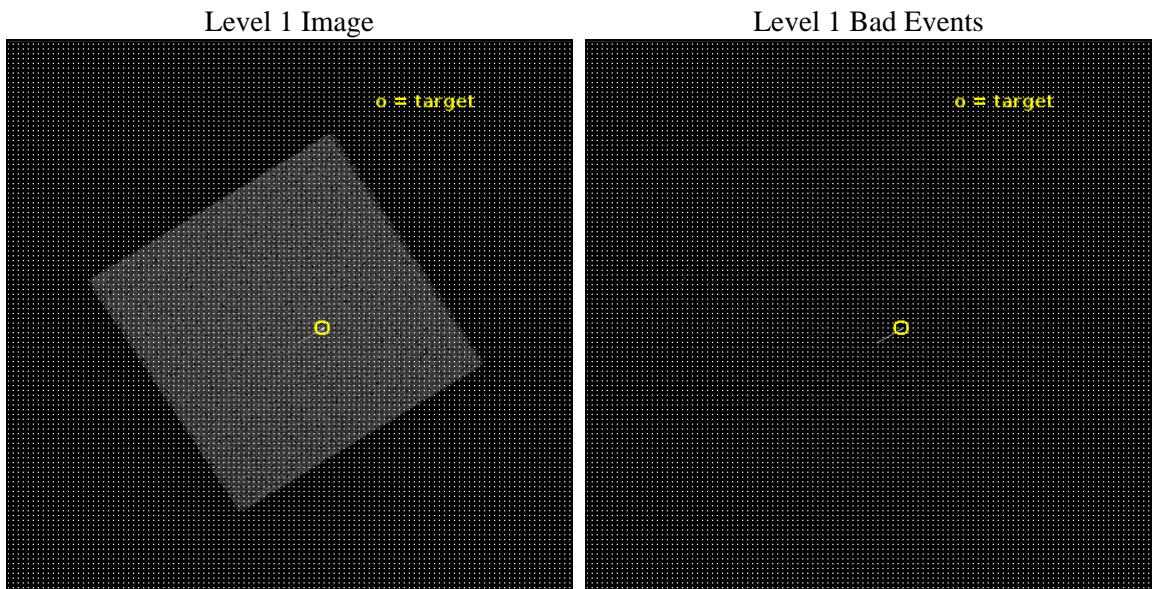
seq_num	291440	Sequence number
obs_id	21754	Observation id
title	AO-20 Calibration Observations to Monitor the Spatial Variations in the HRC-I Gain	Proposal title
observer	CXC Calibration	Principal investigator
object	ArLac	Source name
ra_targ	332.169666	Observer's specified target RA [deg]
dec_targ	45.742509	Observer's specified target Dec [deg]
ra_nom	332.25804270172	Nominal RA [deg]
dec_nom	45.751793980857	Nominal Dec [deg]
roll_nom	192.66492217707	Nominal Roll [deg]
revision	1	Processing version of data
ontime	1187.9750715494	[s]
livetime	1171.0098598344	Ontime multiplied by DTCOR
l2events	150107	Number of level 2 events



## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



### 2.1.2 Parameters

obi_num	0	Obi number	sched_exp_time	1000.000000	[s] Scheduled observation exposure time
ascdsver	10.8	Processing system revision	ontime	1187.9750715494	[s]
caldbver	4.8.4	&#160	l1events	247193	Number of level 1 events
date	2019-09-04T15:07:04	Date and time of file creation			
revision	1	Processing version of data			

### 2.1.3 Events

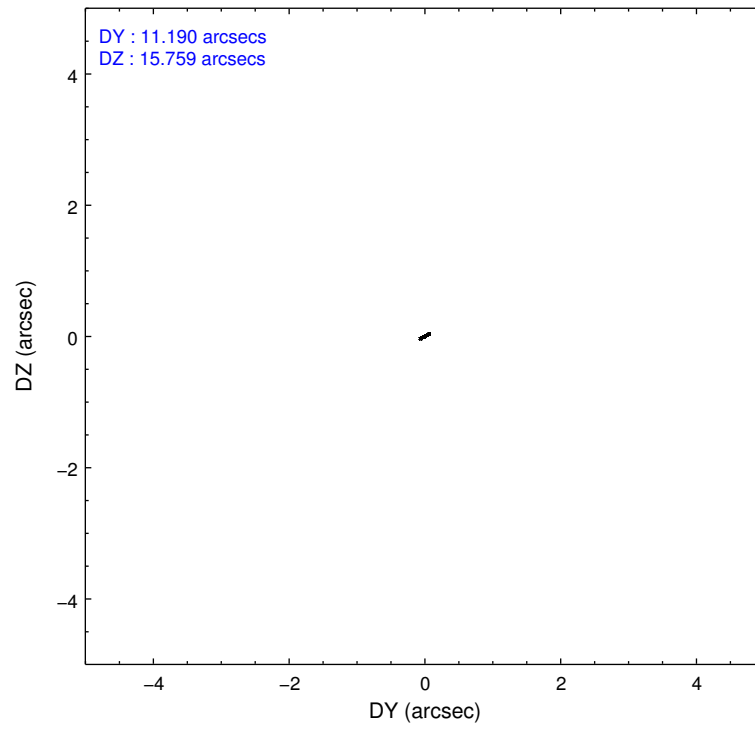
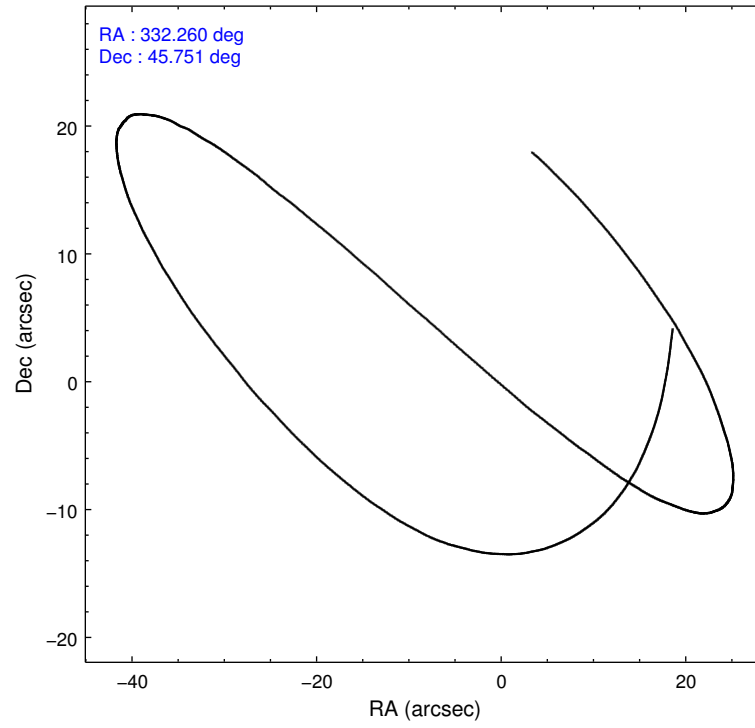
#### Level 1 Events

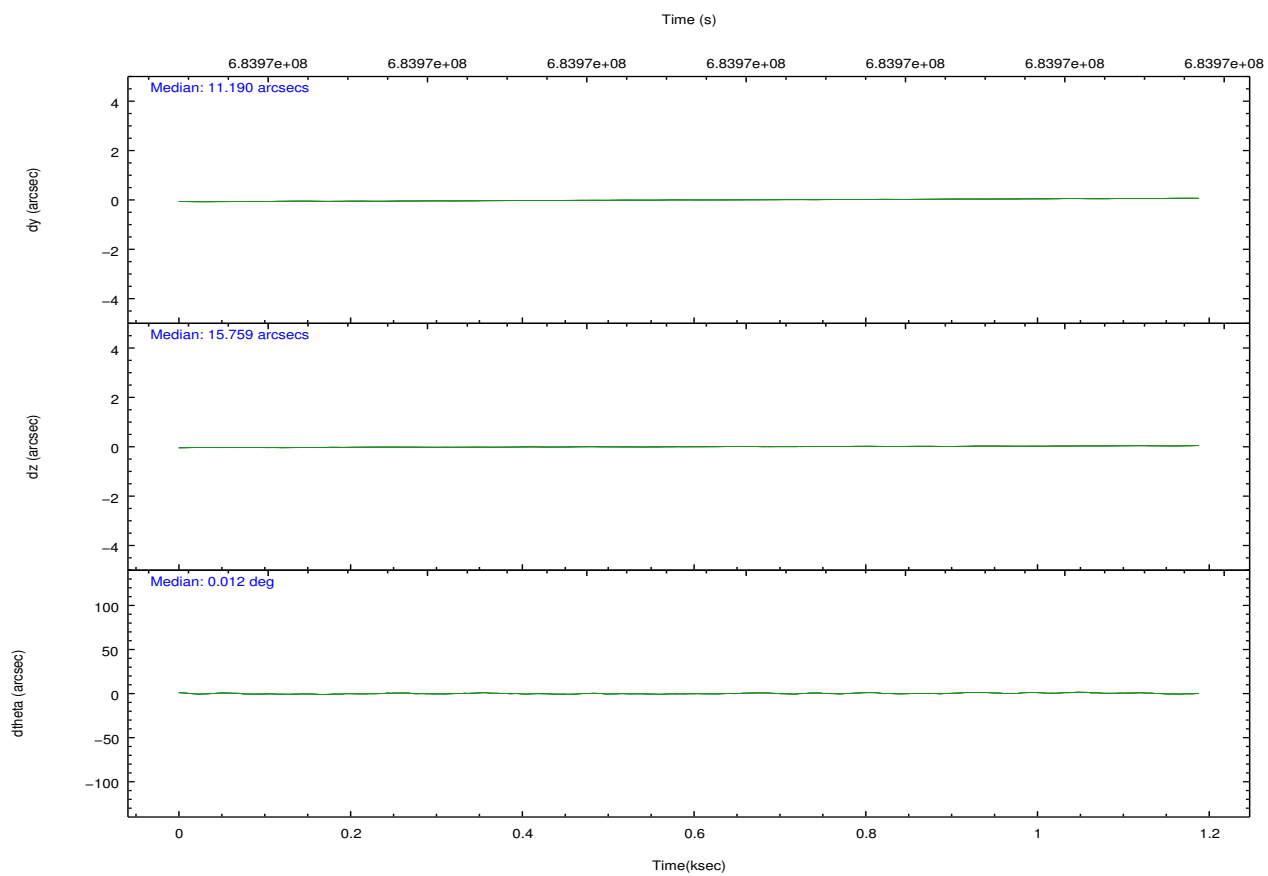
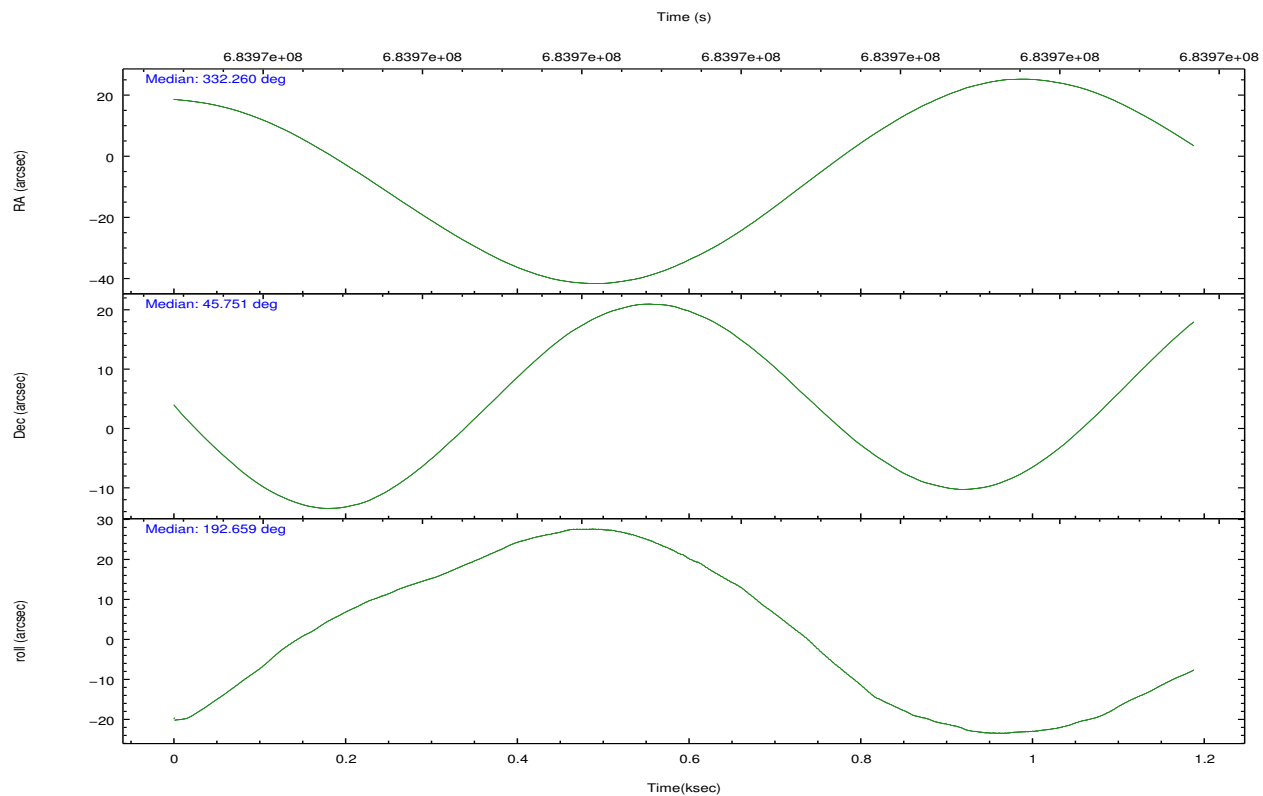
	<b>segment 0</b>
level 1 events	247193
rejected events	52338
rejected %	21%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	HRC	HRC	Obspar format version number	7	7
Detector	HRC-I	HRC-I	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	OBSERVING	OBSERVING			
Observation mode	POINTING	POINTING			
[deg] Pointing RA	332.285386	332.2580427017152			
[deg] Pointing Dec	45.771739	45.75179398085655			
[deg] Pointing Roll	192.740819	192.6649221770714			
[mm] SIM focus pos	-1.040293	-1.038866356238299			
[mm] SIM defocus	0	0.001426264420575141			
[mm] SIM translation stage pos	126.985494	126.9854943052878			
[mm] SIM translation stage offset	0	-5.413686238853188e-06			
[s] Observation start time (MET)	683967703.184000	683967327.18707			
Observation start date	2019-09-04T07:00:34	2019-09-04T06:55:27			
[s] Observation end time (MET)	683968703.184000	683968837.52466			
Observation end date	2019-09-04T07:17:14	2019-09-04T07:20:37			

## 2.3 Aspect





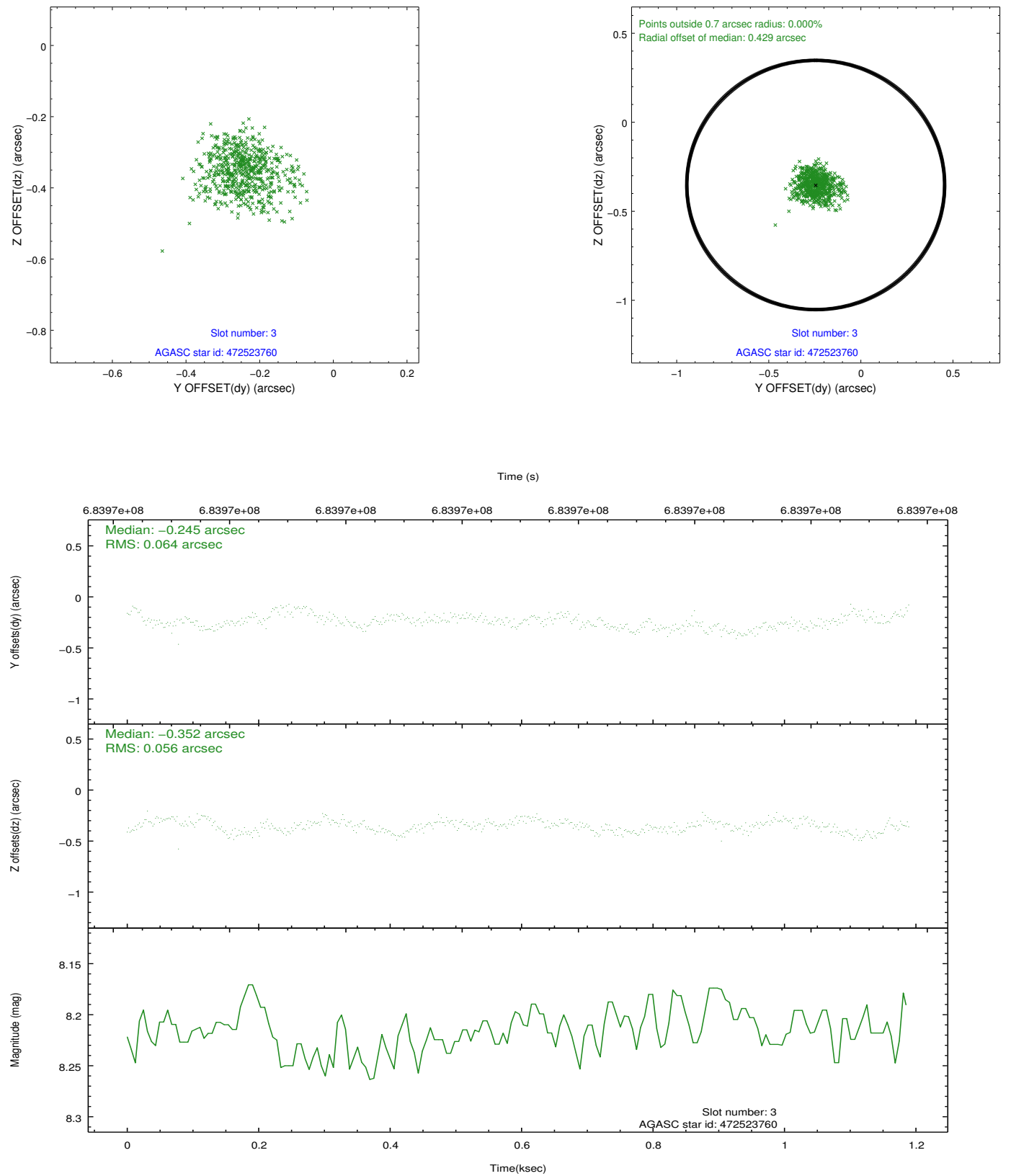
Slot Statistics

pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		HRC-I-1	7.05	290	1.000	-0.190	-0.187	0.008	0.013	0.000000	0.000000	-767.15	-1304
1	FID		HRC-I-3	7.12	290	1.000	-0.252	-0.110	0.008	0.014	0.000000	0.000000	-1198.20	996
2	FID		HRC-I-4	7.06	290	1.000	0.555	0.209	0.006	0.009	0.000000	0.000000	1272.40	1001
3	GUIDE	used	472523760	8.22	581	1.000	-0.245	-0.352	0.093	0.144	331.645363	45.403260	1870.64	927
4	GUIDE	used	472525528	6.64	581	1.000	-0.508	-0.476	0.091	0.147	331.551102	45.248694	2232.51	1415
5	GUIDE	used	472535576	7.83	581	1.000	0.143	0.147	0.117	0.193	331.438373	46.291802	1645.72	-2302
6	GUIDE	used	472665256	8.96	581	1.000	0.513	0.486	0.134	0.210	332.808125	46.195041	-1602.39	-1210
7	GUIDE	used	472533912	9.12	580	1.000	0.099	0.210	0.207	0.317	331.791136	46.368695	722.06	-2376

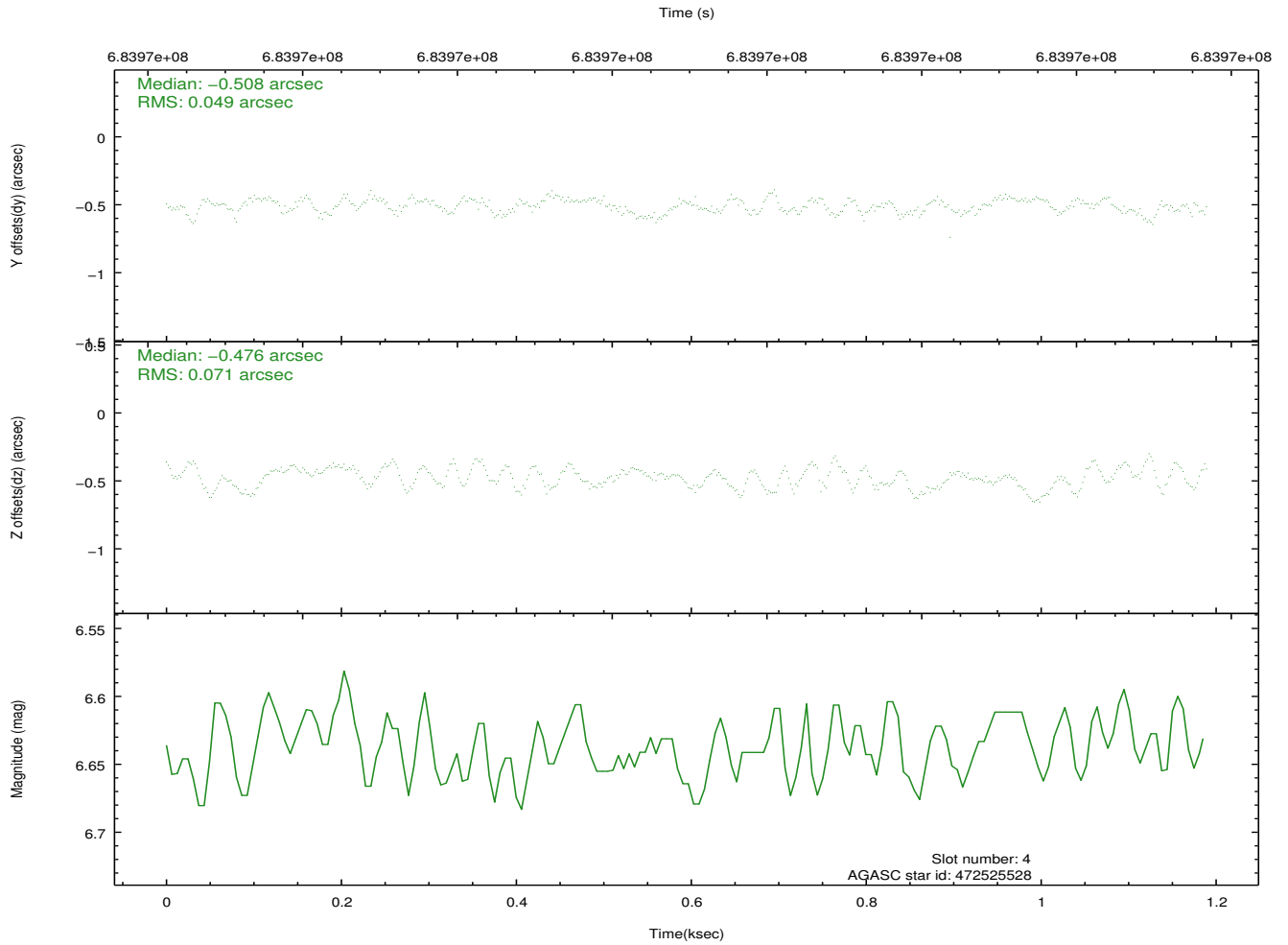
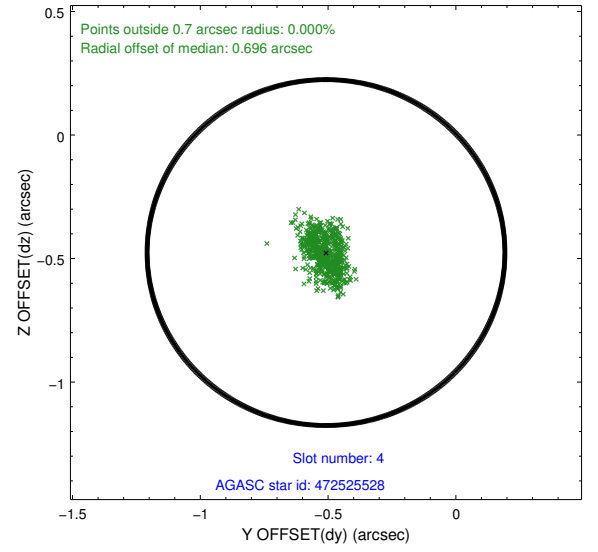
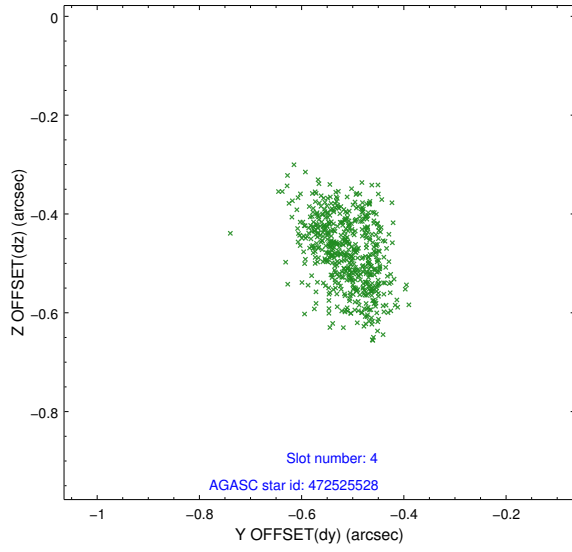


## 2.4 Star Slots

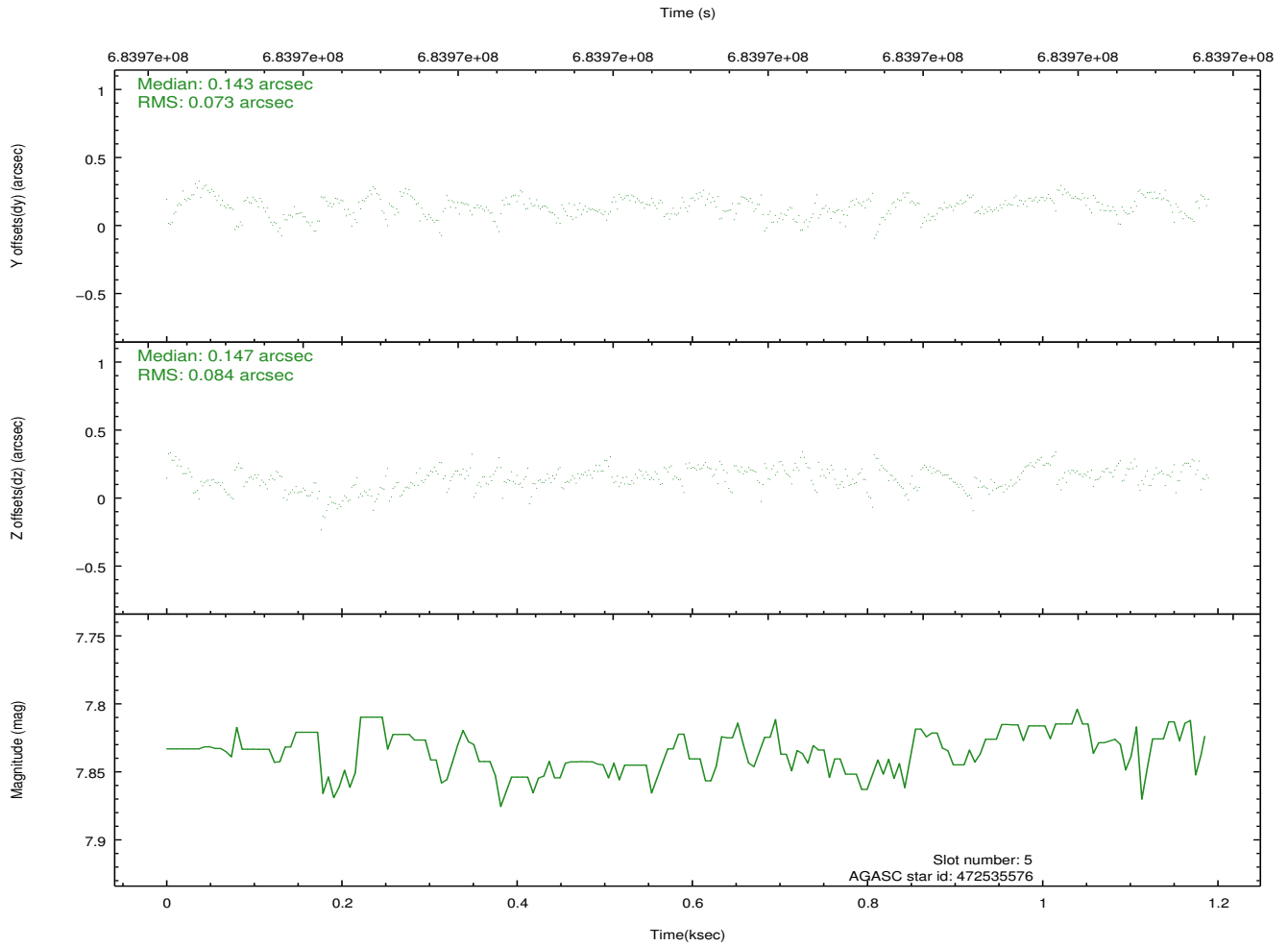
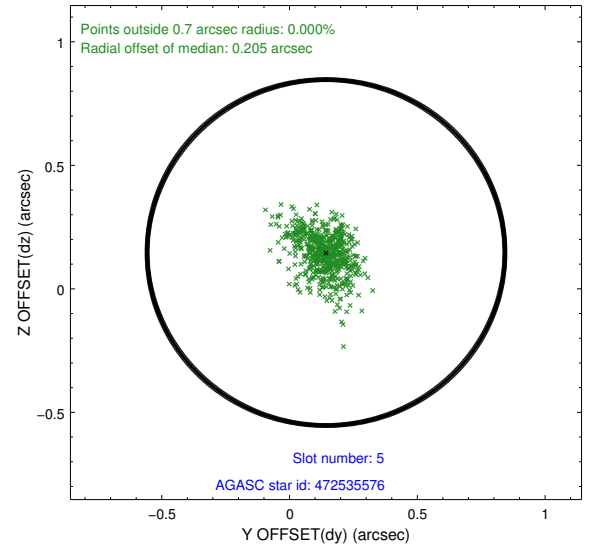
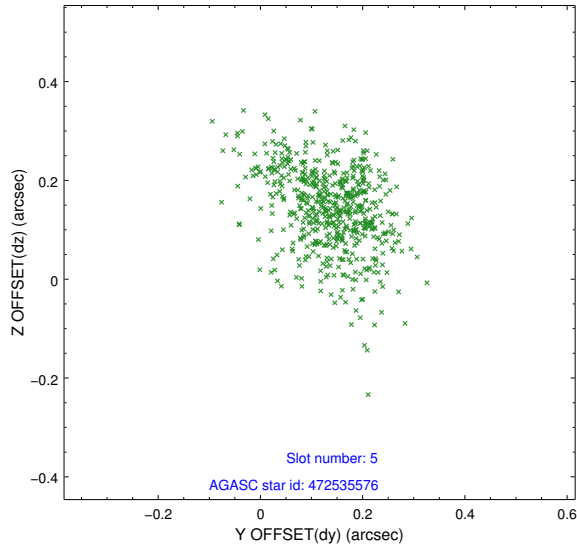
### 2.4.1 Slot 3



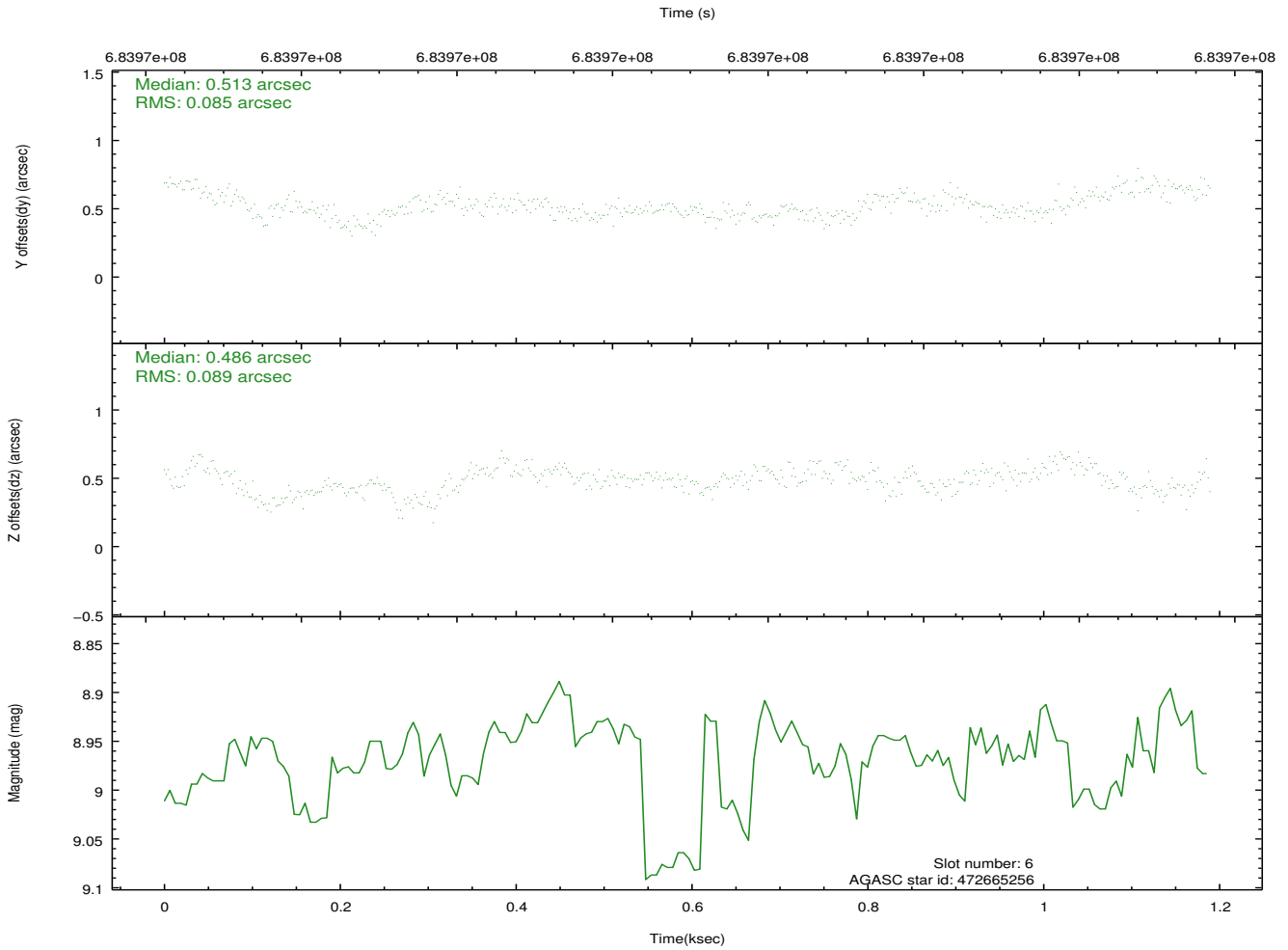
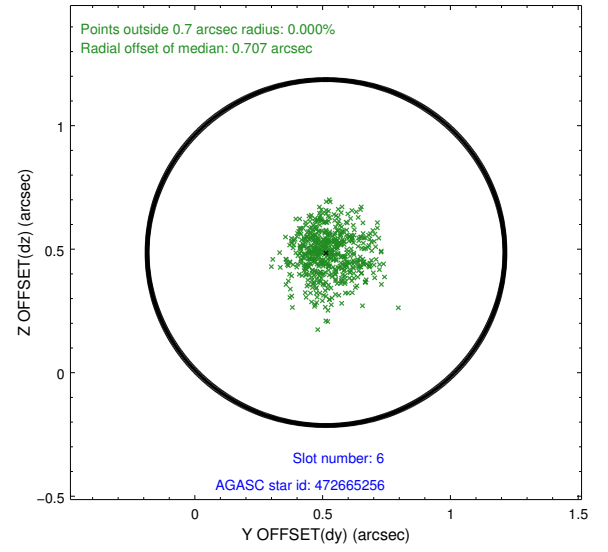
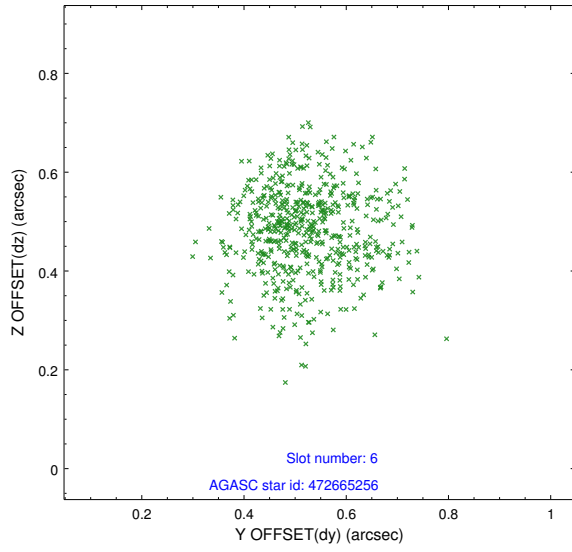
## 2.4.2 Slot 4



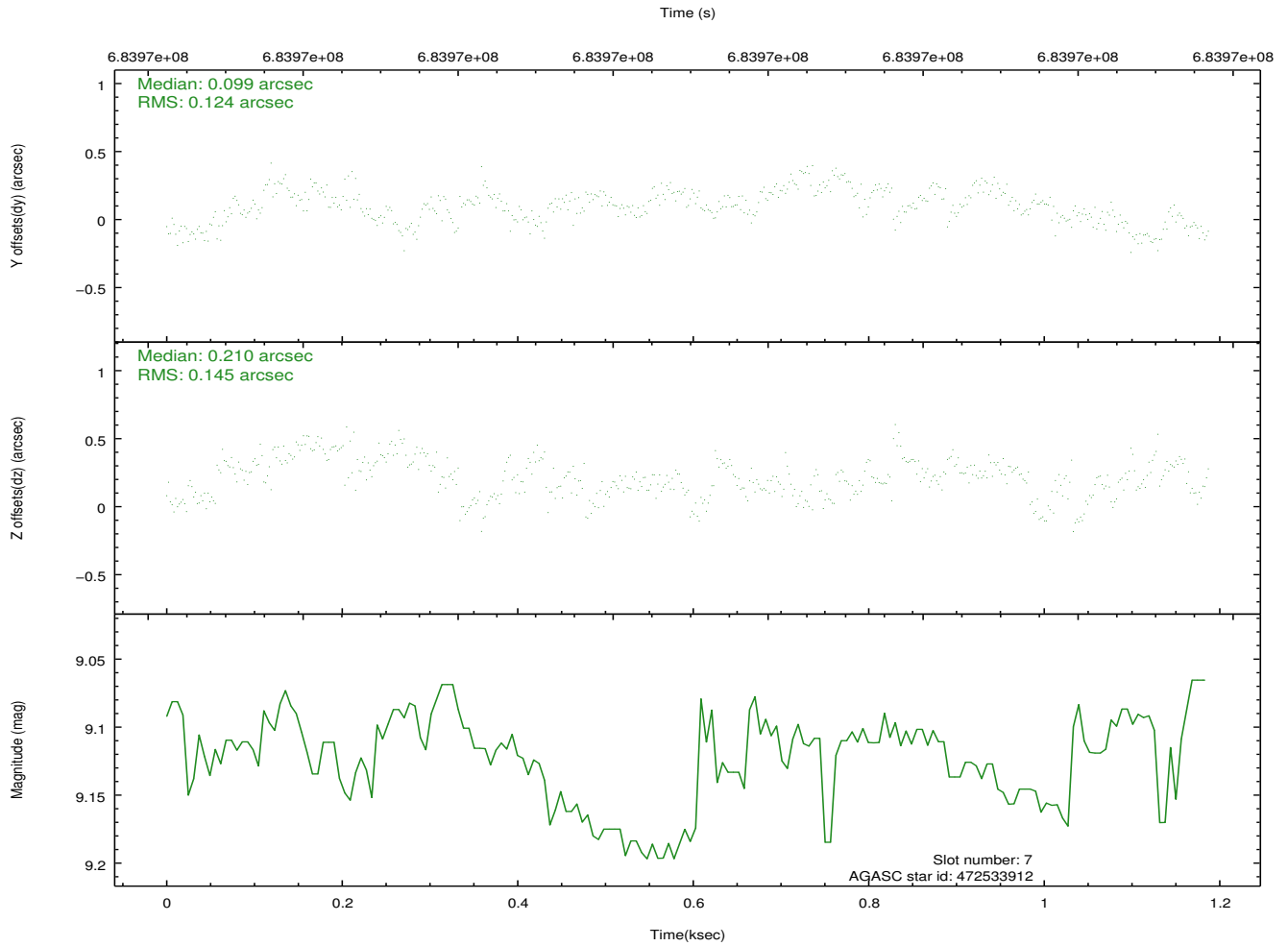
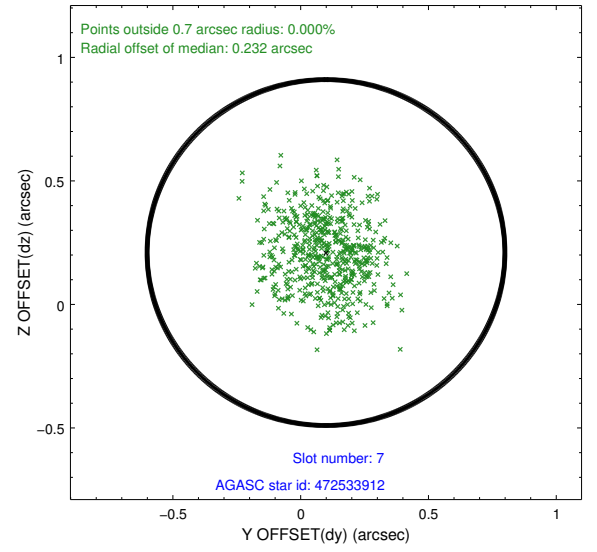
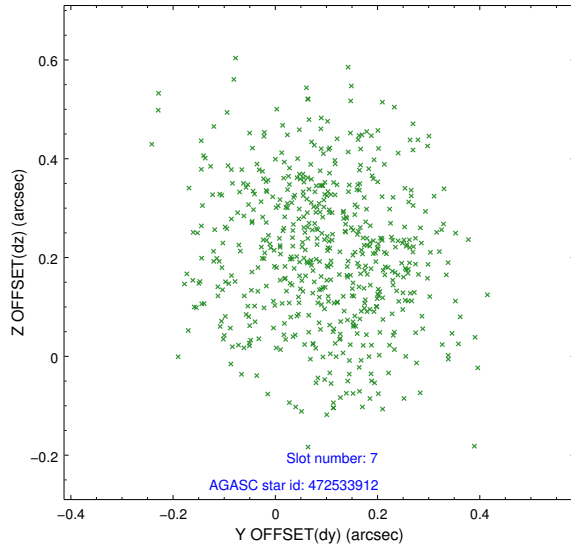
### 2.4.3 Slot 5



## 2.4.4 Slot 6

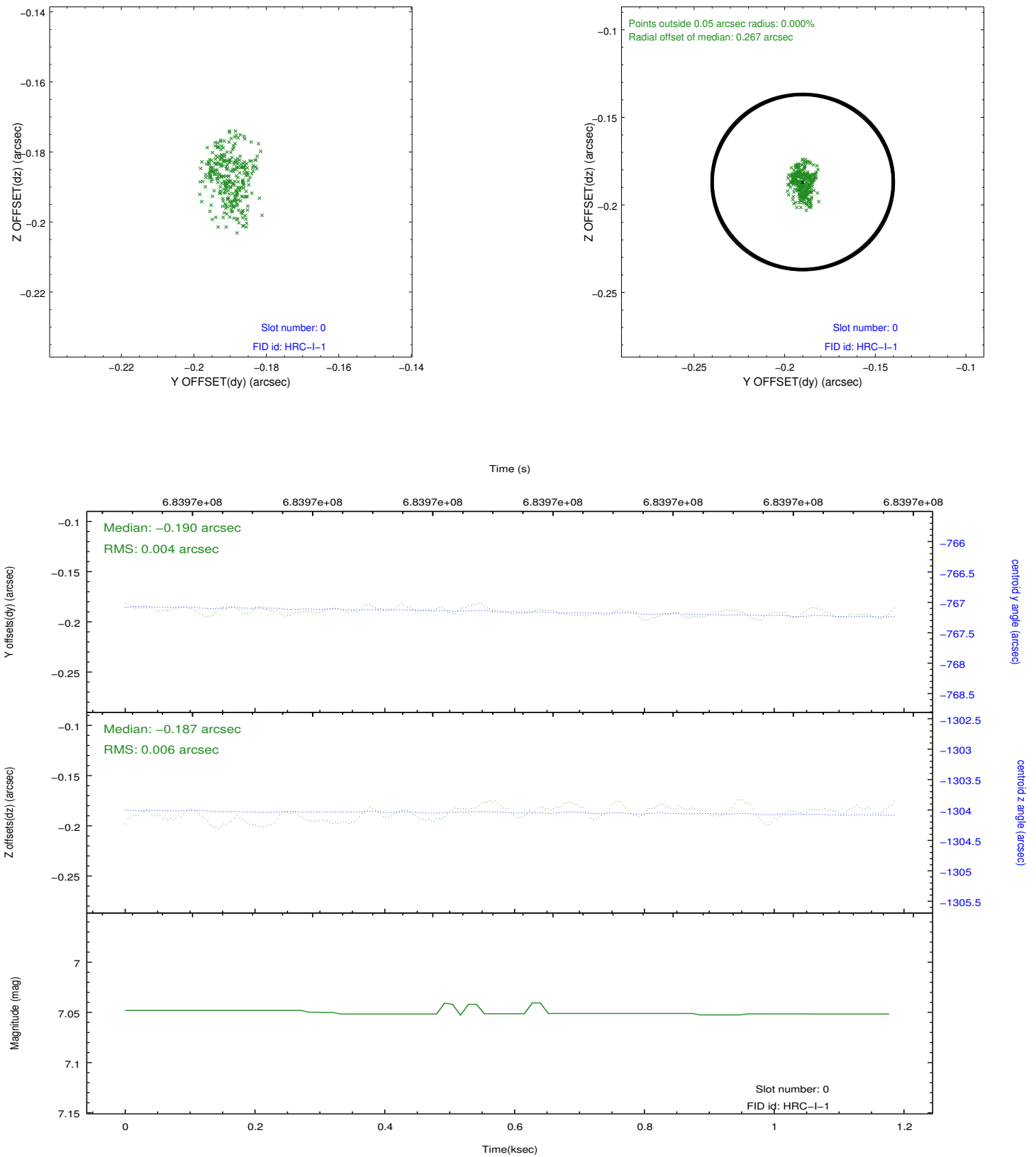


## 2.4.5 Slot 7

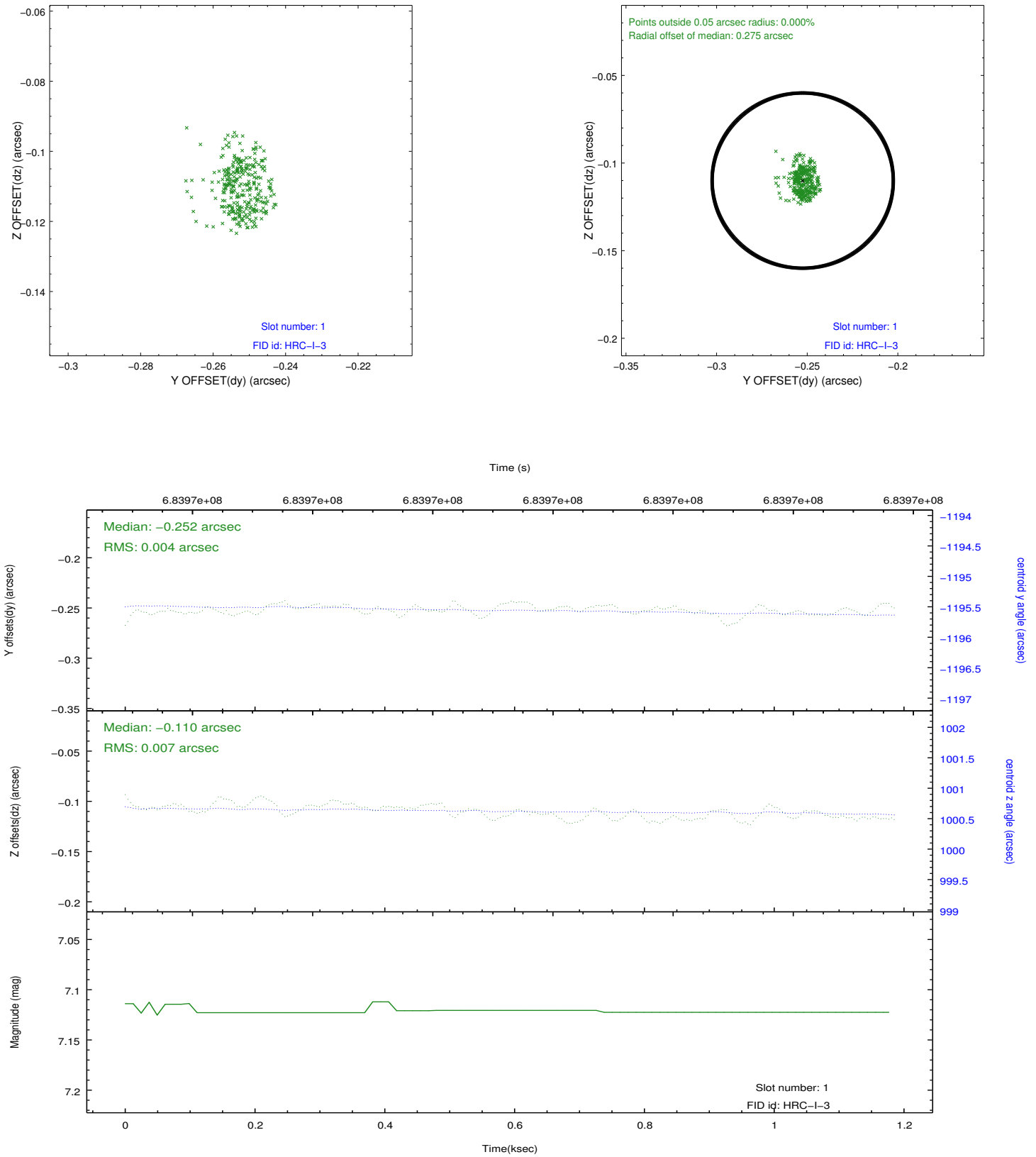


## 2.5 FID Slots

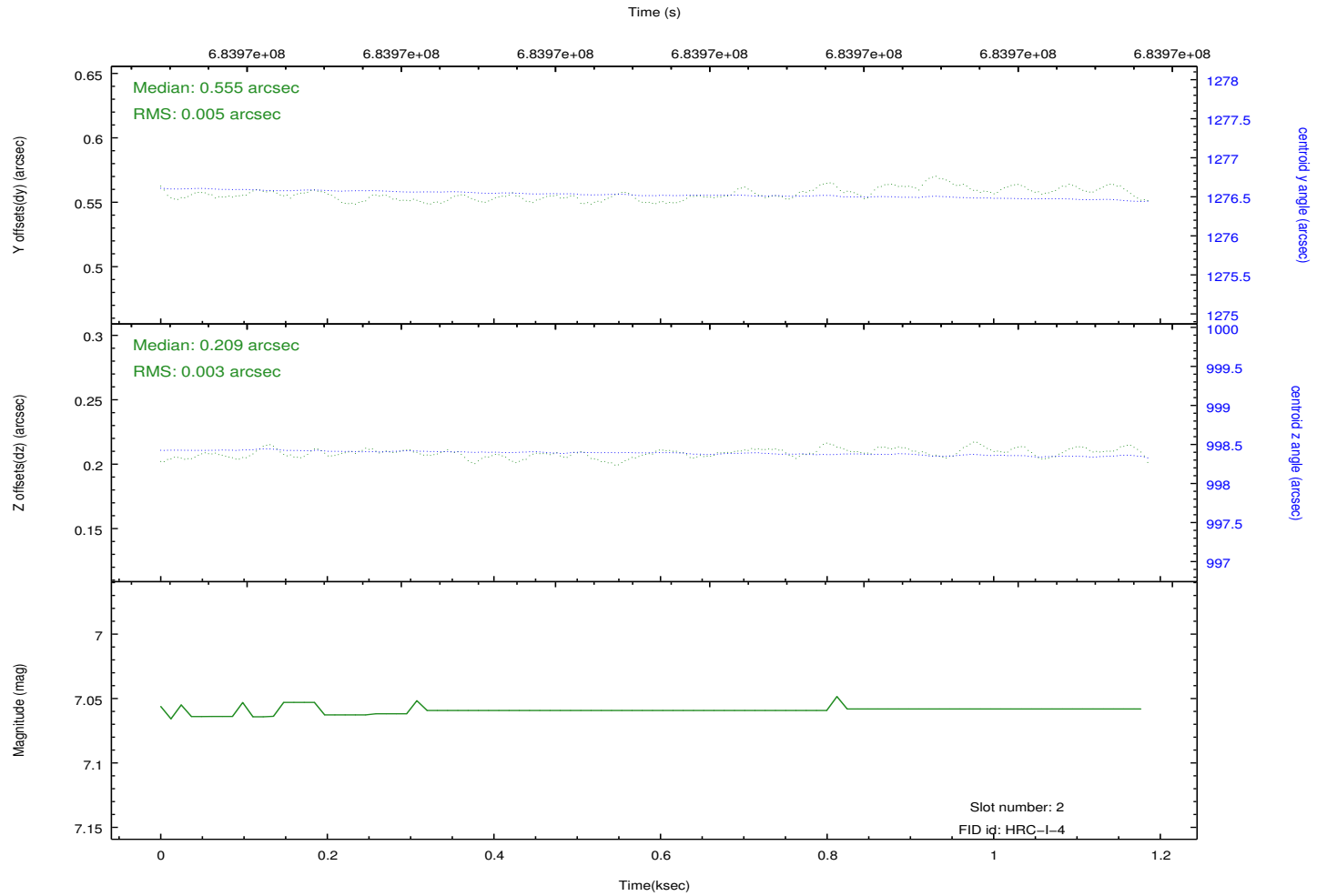
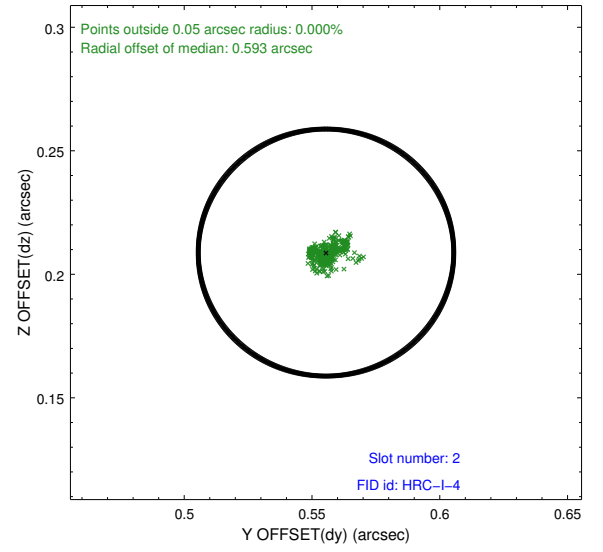
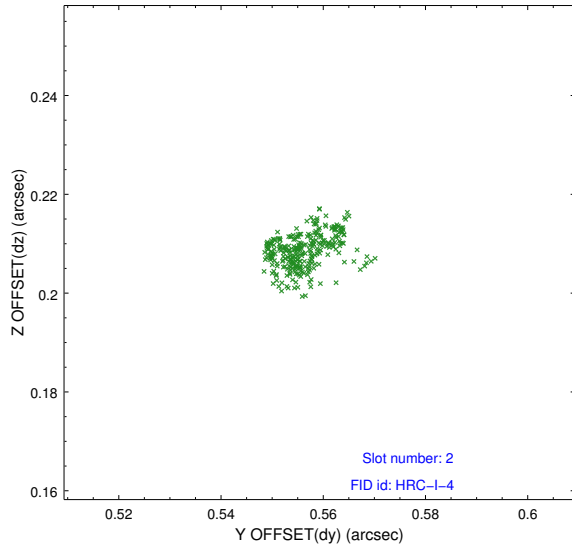
### 2.5.1 Slot 0



## 2.5.2 Slot 1



### 2.5.3 Slot 2





## A Summary

### A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2019.09.04
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	1.1879750715494

### A.2 Comments